

FACT SHEET FOR STATE WASTE DISCHARGE PERMIT ST-8061
FACILITY NAME WASHINGTON STATE UNIVERSITY MEDICAL
WASTE INCINERATOR

SUMMARY

The Washington State University (WSU) Medical Waste Incinerator is located on the WSU campus. The campus is in the city of Pullman about 70 miles south of the city of Spokane in Whitman County. The university has a current enrollment of about 17,000.

The incinerator has been operating since 1999. This incinerator replaced the incinerator that had been in operations since 1978. Currently, the incinerator is operating 5 days/week, for one 12-hour shift/day. The waste treated at the incinerator includes; pathological wastes (infected animals that cannot be rendered, animal waste from infected animals), medical waste and low level radioactive wastes from the veterinary school and other WSU departments. The operation of the wet scrubber used for air quality control generates a small amount of wastewater that is discharged to the WSU collection system and then to Pullman's Wastewater Treatment Facility.

The first permit was amended in September 2003. This amended permit was for reducing the amount of sampling for dioxins, furans, and mercury, from quarterly to semi-annually. WSU originally requested that the sampling be reduced from quarterly to annually. However, with citizen concerns about the waste discharge, the State reduced the sampling to semi-annually. Also, testing for dioxins and furans was requested to be changed to 2,3,7,8 TCDD and 2,3,7,8 TCDF. This request was also granted.

Based on the wastewater discharge flow data, the incinerator monthly average daily flow is approximately 4,284 gallons per day. The permit application is requesting 6,000 gpd. Additionally, WSU is requesting a daily maximum of 9,500 gallons per day.

The incinerator uses a wet scrubber, located after the secondary incineration chamber, to intercept the flue gases that exit the facility, to meet the pertinent air quality requirements. The scrubber is designed to meet new proposed federal regulations for medical waste incinerators. The scrubber/cooling tower discharge is then sent to a dual chamber pre-treatment tank. The first chamber acts as a settling basin to remove solids. The second chamber is a pump chamber which will periodically discharge to a pressure sewer line, then to the WSU gravity sanitary sewer, then to the City of Pullman sanitary sewer, and finally to the Pullman Wastewater Treatment facility. Both chambers are 500 gallons, and the wastewater flow is measured after the second chamber. A schematic of the medical waste incinerator process is in Appendix E – Information: Diagram #1-Process Diagram.

The previous permit for this facility was issued on November 9, 1999 and amended on September 22, 2003. The Department proposes that the permit be issued for five years.

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INTRODUCTION

This fact sheet is a companion document to the draft State Waste Discharge Permit No. **ST-8061**. The Department of Ecology (the Department) is proposing to issue this permit, which will allow discharge of wastewater from WSU Medical Incinerator to the City of Pullman Wastewater Plant. This fact sheet explains the nature of the proposed discharge, the Department's decisions on limiting the pollutants in the wastewater, and the regulatory and technical bases for those decisions.

Washington State law (RCW 90.48.080 and 90.48.160) requires that a permit be issued before discharge of wastewater to waters of the state is allowed. This statute includes commercial or industrial discharges to sewerage systems operated by municipalities or public entities which discharge into public waters of the state. Regulations adopted by the state include procedures for issuing permits and establish requirements which are to be included in the permit (Chapter 173-216 WAC).

This fact sheet and draft permit are available for review by interested persons as described in Appendix A—Public Involvement Information.

The fact sheet and draft permit have been reviewed by the Permittee. Errors and omissions identified in these reviews have been corrected before going to public notice. After the public comment period has closed, the Department will summarize the substantive comments and the response to each comment. The summary and response to comments will become part of the file on the permit and parties submitting comments will receive a copy of the Department's response. The fact sheet will not be revised. Changes to the permit will be addressed in Appendix D—Response to Comments.

GENERAL INFORMATION	
Applicant	Washington State University
Facility Name and Address	Medical Waste Incinerator; Dairy Road: Pullman, WA 99164-1101
Type of Facility:	Medical Waste Incinerator SIC 4953 (Scrubber Blowdown/Cooling tower discharge)
Facility Discharge Location	Latitude: 46° 43' 55" N Longitude: 117° 08' 81" W.
Treatment Plant Receiving Discharge	Pullman Wastewater Treatment Facility
Contact at Facility	Name: Gene Patterson: Public Health/Air & Water Quality Manager Telephone #: (509) 335-3041
Responsible Official	Name: Glenn Ford Title: Associate Vice President for Business Affairs Address: Office of the Vice President for Business Affairs; PO Box 641045; Pullman, WA 99164-1045 Telephone #: (509) 335-5524 FAX # (509) 335-4642

BACKGROUND INFORMATION

DESCRIPTION OF THE FACILITY

Washington State University is located in the city of Pullman about 70 miles south of the city of Spokane in Whitman County. The university has a current enrollment of about 17,000. The incinerator is located within the WSU campus boundaries and the city limits of the City of Pullman. The incinerator is also located near Dairy Road, north of the existing compost facility at the southeast end of campus. See Appendix E – Information: Map 1 and 2. This will show the location and site map of the Medical Waste Incinerator.

HISTORY

The incinerator has been operating since 1999. This incinerator replaced the incinerator that had been in operations since 1978. Currently, the incinerator is operating 5 days/week, for one 12 hour shift/day. The waste treated at the incinerator includes pathological wastes (infected animals that cannot be rendered, animal waste from infected animals), medical waste and low level radioactive wastes from the veterinary school and other WSU departments. The operation of the wet scrubber used for air quality control generates a small amount of wastewater that is discharge to the WSU collection system and then to Pullman's Wastewater Treatment Facility.

The first permit was amended in September 2003. This amended permit was for reducing the amount of sampling for dioxins, furans, and mercury, from quarterly to semi-annually. WSU originally requested that the sampling be reduced from quarterly to annually. However, with citizen concerns about the waste discharge, the State reduced the sampling to semi-annually. Also, testing for dioxins and furans was requested to be changed to 2,3,7,8 TCDD and 2,3,7,8 TCDF. This request was also granted. Additionally, WSU requested that priority pollutants be sampled every 3 years. However, the Department of Ecology feels at this time that that is too long between samples. Thus, priority pollutants will be every two years at this time.

Based on the wastewater discharge flow data, the incinerator monthly average daily flow is approximately 4,284 gallons per day. The permit application is requesting 6,000 gpd. Additionally, WSU is requesting a daily maximum of 9,500 gallons per day. With the last 3 years flow data, the discharge only twice exceeded the daily maximum flow rate (9,715 the first day and 10,662 gpd the next) in December 2002. This excess discharge was due to a mandatory air test in which the incinerator was burning approximately 750 lb/hr of waste. This test occurs every 3 years and the next test will be sometime in year 2005. The wastewater discharge flow diagram is located in Appendix E – Information: Diagram #2-Wastewater Discharge Flow.

INDUSTRIAL PROCESSES

The incinerator is a controlled-air type unit, which employs a two-stage combustion process utilizing two separate combustion chambers. The primary (or ignition) chamber initiates combustion of waste with high temperature insulation and refractory or firebrick to contain the heat. The primary combustion chamber uses less than the amount of oxygen theoretically required for complete incineration. This slower, less turbulent burning is intended to release fewer particulates than combustion with excess air.

The secondary chamber is insulated, refractory-lined, and is equipped with a combustion air fan to supply sufficient air to create excess air, or oxidizing conditions, allowing the gases to be burned and minimizing the emission of carbon monoxide. The secondary chamber is fitted with a

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burner to destroy carbonaceous particulate matter through direct contact with the flames. The burner is used to maintain the chamber at a temperature of 1800 degrees F, which helps minimize the formation of dioxins and furans. Controls allow the proper temperatures to be maintained in each chamber, assuring maximum combustion and minimum production for air contaminants. The incinerator has a maximum burn rate of 800 lbs/hr of pathological waste and 200 lbs/hr for medical and low-level radioactive wastes. In a typical week, medical waste is burned first, then pathological and then radioactive waste. A schematic of the medical waste incinerator process is in Appendix E – Information: Diagram #1-Process Diagram.

TREATMENT PROCESSES

The incinerator uses a wet scrubber, located after the secondary incineration chamber, to intercept the flue gases that exit the facility, to meet the pertinent air quality requirements. The scrubber uses water mixed with sodium hydroxide to “scrub” or neutralize the acids in the flue gases. The water cools the gases to about 200 degrees F which aids in condensing and capturing heavy metals and unburned organics. This is followed by an absorber section to increase the contact time for mixing the flue gases and scrubbing water, and a de-mister to remove the water droplets which contain particulates, and to neutralize acids from the exhaust gas. The scrubber is designed to meet new proposed federal regulations for medical waste incinerators.

The scrubber/cooling tower discharge is sent to a dual chamber pre-treatment tank. The first chamber acts as a settling basin to remove solids. The second chamber is a pump chamber which will periodically discharge to a pressure sewer line, then to the WSU gravity sanitary sewer, then to the City of Pullman sanitary sewer, and finally to the Pullman Wastewater Treatment facility. Both chambers are 500 gallons, and the wastewater flow is measured after the second chamber.

PERMIT STATUS

The previous permit for this facility was issued on November 9, 1999 and amended permit on September 22, 2003.

An application for permit renewal was received by the Department on December 23, 2003 and accepted by the Department on February 12, 2004.

SUMMARY OF COMPLIANCE WITH THE PREVIOUS PERMIT

The facility last received a compliance inspection without sampling on April 21, 2004.

During the history of the previous permit, the Permittee has remained in compliance based on Discharge Monitoring Reports (DMRs) and other reports submitted to the Department and inspections conducted by the Department.

WASTEWATER CHARACTERIZATION

The concentration of pollutants in the discharge was reported in the permit application and in discharge monitoring reports. The proposed wastewater discharge is characterized for the following parameters:

Parameter	Concentration
Arsenic	0.001 mg/l
Cadmium	0.002 mg/l

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Parameter	Concentration
Chromium	0.005 mg/l
Copper	0.027 mg/l
Lead	0.062 mg/l
Mercury	0.0003 mg/l
Nickel	Not Detected
Selenium	0.001 mg/l
Silver	Not Detected
Zinc	0.468 mg/l
FOG (free oil and grease)	Not Detected
pH	8.33 s.u.
Temperature	100 degrees F
Sodium Chloride	Chloride 78 mg/L; Sodium 356 mg/l
Suspended Solids	19 mg/l

PROPOSED PERMIT LIMITATIONS

State regulations require that limitations set forth in a waste discharge permit must be based on the technology available to treat the pollutants (technology-based) or be based on the effects of the pollutants to the POTW (local limits). Wastewater must be treated using all known, available, and reasonable treatment (AKART) and not interfere with the operation of the POTW.

The minimum requirements to demonstrate compliance with the AKART standard and specific design criteria for this facility were determined in "Environmental Impact Statement for Washington State University Replacement Medical Waste Incinerator," October 1996, and the compliance with current permit that expires June 30, 2004.

The more stringent of the local limits-based or technology-based limits are applied to each of the parameters of concern. Each of these types of limits is described in more detail below.

TECHNOLOGY-BASED EFFLUENT LIMITATIONS

All waste discharge permits issued by the Department must specify conditions requiring available and reasonable methods of prevention, control, and treatment of discharges to waters of the state (WAC 173-216-110). Currently, this facility appears to have no existing federal categorical limitations that are found under 40 CFR Part 405-471. The following permit limitations are necessary to satisfy the requirement for AKART:

EFFLUENT LIMITATIONS BASED ON LOCAL LIMITS

Pollutant concentrations in the proposed discharge with technology-based controls in place will not cause problems at the receiving POTW such as interference, pass-through or hazardous

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exposure to POTW workers nor will it result in unacceptable pollutant levels in the POTW's sludge.

COMPARISON OF LIMITATIONS WITH THE EXISTING PERMIT ISSUED

The existing and proposed limits are the same as in the current permit that expires June 30, 2004.

MONITORING REQUIREMENTS

Monitoring, recording, and reporting are specified to verify that the treatment process is functioning correctly, and that effluent limitations are being achieved (WAC 173-216-110).

The monitoring schedule is detailed in the proposed permit under Condition S2. Specified monitoring frequencies take into account the quantity and variability of the discharge, the treatment method, past compliance, significance of pollutants, and cost of monitoring.

This permit will continue to specifically require that WSU monitor for dioxins, furans, and mercury, as well as other constituents that have been identified as being present in the wastewater. These pollutant(s) could have a significant impact on the receiving environment. WSU will also continue to test for those 126 priority pollutants not already scheduled for testing, as listed in Tables II and III of 40 CFR, part 122, Appendix D, every two years. The permit also specifies that PVC items will continue to be segregated from the waste stream and, to the maximum possible extent, alternately disposed of.

Monitoring for 2, 3, 7, 8 TCDD, 2,3,7,8 TCDF, Mercury, priority pollutants are being required to further characterize the effluent. These pollutant(s) could have a significant impact on the receiving POTW.

OTHER PERMIT CONDITIONS

REPORTING AND RECORDKEEPING

The conditions of S3 are based on the authority to specify any appropriate reporting and recordkeeping requirements to prevent and control waste discharges (WAC 173-216-110 and 40 CFR 403.12 (e),(g), and (h)).

OPERATIONS AND MAINTENANCE

The proposed permit contains condition S.5. as authorized under Chapter 173-240-150 WAC and Chapter 173-216-110 WAC. It is included to ensure proper operation and regular maintenance of equipment, and to ensure that adequate safeguards are taken so that constructed facilities are used to their optimum potential in terms of pollutant capture and treatment.

PROHIBITED DISCHARGES

Certain pollutants are prohibited from being discharged to the POTW. These include substances which cause pass-through or interference, pollutants which may cause damage to the POTW or harm to the POTW workers (Chapter 173-216 WAC) and the discharge of designated dangerous wastes not authorized by this permit (Chapter 173-303 WAC).

DILUTION PROHIBITED

The Permittee is prohibited from diluting its effluent as a partial or complete substitute for adequate treatment to achieve compliance with permit limitations.

NON-ROUTINE AND UNANTICIPATED DISCHARGES

Occasionally, this facility may generate wastewater which is not characterized in their permit application because it is not a routine discharge and was not anticipated at the time of application. These typically are waters used to pressure test storage tanks or fire water systems or leaks from drinking water systems. These are typically clean waste waters but may be contaminated with pollutants. The permit contains an authorization for non-routine and unanticipated discharges. The permit requires a characterization of these waste waters for pollutants and examination of the opportunities for reuse. Depending on the nature and extent of pollutants in this wastewater and opportunities for reuse, Ecology may authorize a direct discharge to the municipality, require the wastewater to be placed through the facilities wastewater treatment process or require the water to be reused.

GENERAL CONDITIONS

General Conditions are based directly on state laws and regulations and have been standardized for all industrial waste discharge to POTW permits issued by the Department.

Condition G1 requires responsible officials or their designated representatives to sign submittals to the Department. Condition G2 requires the Permittee to allow the Department to access the treatment system, production facility, and records related to the permit. Condition G3 specifies conditions for modifying, suspending or terminating the permit. Condition G4 requires the Permittee to apply to the Department prior to increasing or varying the discharge from the levels stated in the permit application. Condition G5 requires the Permittee to construct, modify, and operate the permitted facility in accordance with approved engineering documents. Condition G6 prohibits the Permittee from using the permit as a basis for violating any laws, statutes or regulations. Conditions G7 and G8 relate to permit renewal and transfer. Condition G9 requires the Permittee to control production or wastewater discharge in order to maintain compliance with the permit. Condition G10 prohibits the reintroduction of removed pollutants into the effluent stream for discharge. Condition G11 requires the payment of permit fees. Condition G12 describes the penalties for violating permit conditions.

PUBLIC NOTIFICATION OF NONCOMPLIANCE

A list of all industrial users which were in significant noncompliance with Pretreatment Standards or Requirements during any of the previous four quarters may be annually published by the Department in a local newspaper. Accordingly, the Permittee is apprised that noncompliance with this permit may result in publication of the noncompliance.

RECOMMENDATION FOR PERMIT ISSUANCE

This proposed permit meets all statutory requirements for authorizing a wastewater discharge, including those limitations and conditions believed necessary to control toxics. The Department proposes that the permit be issued for five years.

REFERENCES FOR TEXT AND APPENDICES

Washington State Department of Ecology.

Laws and Regulations(<http://www.ecy.wa.gov/laws-rules/index.html>)

Permit and Wastewater Related Information

(<http://www.ecy.wa.gov/programs/wq/wastewater/index.html>)

APPENDICES

APPENDIX A—PUBLIC INVOLVEMENT INFORMATION

The Department has tentatively determined to reissue a permit to the applicant listed on page 1 of this fact sheet. The permit contains conditions and effluent limitations which are described in the rest of this fact sheet.

Public notice of application was published on May 17 and May 24, 2004 in the Moscow Pullman Daily News to inform the public that an application had been submitted and to invite comment on the reissuance of this permit.

The Department will publish a Public Notice of Draft (PNOD) on June 24, 2004 in the Moscow-Pullman Daily News to inform the public that a draft permit and fact sheet are available for review. Interested persons are invited to submit written comments regarding the draft permit. The draft permit, fact sheet, and related documents are available for inspection and copying between the hours of 8:00 a.m. and 5:00 p.m. weekdays, by appointment, at the regional office listed below. Written comments should be mailed to:

Water Quality Permit Coordinator
Department of Ecology
Eastern Regional Office
4601 North Monroe Street
Spokane, WA 99205-1295

Any interested party may comment on the draft permit or request a public hearing on this draft permit within the thirty (30) day comment period to the address above. The request for a hearing shall indicate the interest of the party and reasons why the hearing is warranted. The Department will hold a hearing if it determines there is a significant public interest in the draft permit (WAC 173-216-100). Public notice regarding any hearing will be circulated at least thirty (30) days in advance of the hearing. People expressing an interest in this permit will be mailed an individual notice of hearing.

Comments should reference specific text followed by proposed modification or concern when possible. Comments may address technical issues, accuracy and completeness of information, the scope of the facility's proposed coverage, adequacy of environmental protection, permit conditions, or any other concern that would result from issuance of this permit.

The Department will consider all comments received within thirty (30) days from the date of public notice of draft indicated above, in formulating a final determination to issue, revise, or deny the permit. The Department's response to all significant comments is available upon request and will be mailed directly to people expressing an interest in this permit.

Further information may be obtained from the Department by telephone, (509) 329-3400, or by writing to the address listed above.

This permit was written by Scott Mallery.

APPENDIX B—GLOSSARY

Ammonia—Ammonia is produced by the breakdown of nitrogenous materials in wastewater. Ammonia is toxic to aquatic organisms, exerts an oxygen demand, and contributes to eutrophication. It also increases the amount of chlorine needed to disinfect wastewater.

Average Monthly Discharge Limitation—The average of the measured values obtained over a calendar month's time.

Best Management Practices (BMPs)--Schedules of activities, prohibitions of practices, maintenance procedures, and other physical, structural and/or managerial practices to prevent or reduce the pollution of waters of the State. BMPs include treatment systems, operating procedures, and practices to control: plant site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage. BMPs may be further categorized as operational, source control, erosion and sediment control, and treatment BMPs.

BOD₅--Determining the Biochemical Oxygen Demand of an effluent is an indirect way of measuring the quantity of organic material present in an effluent that is utilized by bacteria. The BOD₅ is used in modeling to measure the reduction of dissolved oxygen in a receiving water after effluent is discharged. Stress caused by reduced dissolved oxygen levels makes organisms less competitive and less able to sustain their species in the aquatic environment. Although BOD is not a specific compound, it is defined as a conventional pollutant under the federal Clean Water Act.

Bypass—The intentional diversion of waste streams from any portion of the collection or treatment facility.

Categorical Pretreatment Standards—National pretreatment standards specifying quantities or concentrations of pollutants or pollutant properties which may be discharged to a POTW by existing or new industrial users in specific industrial subcategories.

Compliance Inspection - Without Sampling--A site visit for the purpose of determining the compliance of a facility with the terms and conditions of its permit or with applicable statutes and regulations.

Compliance Inspection - With Sampling--A site visit to accomplish the purpose of a Compliance Inspection - Without Sampling and as a minimum, sampling and analysis for all parameters with limits in the permit to ascertain compliance with those limits; and, for municipal facilities, sampling of influent to ascertain compliance with the 85 percent removal requirement. Additional sampling may be conducted.

Composite Sample—A mixture of grab samples collected at the same sampling point at different times, formed either by continuous sampling or by mixing discrete samples. May be "time-composite"(collected at constant time intervals) or "flow-proportional" (collected either as a constant sample volume at time intervals proportional to stream flow, or collected by increasing the volume of each aliquot as the flow increased while maintaining a constant time interval between the aliquots.

Construction Activity—Clearing, grading, excavation and any other activity which disturbs the surface of the land. Such activities may include road building, construction of residential houses, office buildings, or industrial buildings, and demolition activity.

Continuous Monitoring –Uninterrupted, unless otherwise noted in the permit.

Engineering Report—A document, signed by a professional licensed engineer, which thoroughly examines the engineering and administrative aspects of a particular domestic or industrial wastewater facility. The report shall contain the appropriate information required in WAC 173-240-060 or 173-240-130.

Grab Sample—A single sample or measurement taken at a specific time or over a short period of time as is feasible.

Industrial User—A discharger of wastewater to the sanitary sewer which is not sanitary wastewater or is not equivalent to sanitary wastewater in character.

Industrial Wastewater—Water or liquid-carried waste from industrial or commercial processes, as distinct from domestic wastewater. These wastes may result from any process or activity of industry, manufacture, trade or business, from the development of any natural resource, or from animal operations such as feed lots, poultry houses, or dairies. The term includes contaminated storm water and, also, leachate from solid waste facilities.

Interference— A discharge which, alone or in conjunction with a discharge or discharges from other sources, both:

Inhibits or disrupts the POTW, its treatment processes or operations, or its sludge processes, use or disposal and;

Therefore is a cause of a violation of any requirement of the POTW's NPDES permit (including an increase in the magnitude or duration of a violation) or of the prevention of sewage sludge use or disposal in compliance with the following statutory provisions and regulations or permits issued thereunder (or more stringent State or local regulations): Section 405 of the Clean Water Act, the Solid Waste Disposal Act (SWDA) (including title II, more commonly referred to as the Resource Conservation and Recovery Act (RCRA), and including State regulations contained in any State sludge management plan prepared pursuant to subtitle D of the SWDA), sludge regulations appearing in 40 CFR Part 507, the Clean Air Act, the Toxic Substances Control Act, and the Marine Protection, Research and Sanctuaries Act.

Local Limits—Specific prohibitions or limits on pollutants or pollutant parameters developed by a POTW.

Maximum Daily Discharge Limitation—The highest allowable daily discharge of a pollutant measured during a calendar day or any 24-hour period that reasonably represents the calendar day for purposes of sampling. The daily discharge is calculated as the average measurement of the pollutant over the day.

Method Detection Level (MDL)--The minimum concentration of a substance that can be measured and reported with 99% confidence that the analyte concentration is above zero and is determined from analysis of a sample in a given matrix containing the analyte.

Pass-through— A discharge which exits the POTW into waters of the-State in quantities or concentrations which, alone or in conjunction with a discharge or discharges from other sources, is a cause of a violation of any requirement of the POTW's NPDES permit (including an increase

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in the magnitude or duration of a violation), or which is a cause of a violation of State water quality standards.

pH—The pH of a liquid measures its acidity or alkalinity. A pH of 7 is defined as neutral, and large variations above or below this value are considered harmful to most aquatic life.

Potential Significant Industrial User--A potential significant industrial user is defined as an Industrial User which does not meet the criteria for a Significant Industrial User, but which discharges wastewater meeting one or more of the following criteria:

- a. Exceeds 0.5 % of treatment plant design capacity criteria and discharges <25,000 gallons per day or;
- b. Is a member of a group of similar industrial users which, taken together, have the potential to cause pass through or interference at the POTW (e.g. facilities which develop photographic film or paper, and car washes).

The Department may determine that a discharger initially classified as a potential significant industrial user should be managed as a significant industrial user.

Quantitation Level (QL)-- A calculated value five times the MDL (method detection level).

Significant Industrial User (SIU)--

- 1) All industrial users subject to Categorical Pretreatment Standards under 40 CFR 403.6 and 40 CFR Chapter I, Subchapter N and;
- 2) Any other industrial user that: discharges an average of 25,000 gallons per day or more of process wastewater to the POTW (excluding sanitary, noncontact cooling, and boiler blow-down wastewater); contributes a process wastestream that makes up 5 percent or more of the average dry weather hydraulic or organic capacity of the POTW treatment plant; or is designated as such by the Control Authority* on the basis that the industrial user has a reasonable potential for adversely affecting the POTW's operation or for violating any pretreatment standard or requirement (in accordance with 40 CFR 403.8(f)(6)).

Upon finding that the industrial user meeting the criteria in paragraph 2, above, has no reasonable potential for adversely affecting the POTW's operation or for violating any pretreatment standard or requirement, the Control Authority* may at any time, on its own initiative or in response to a petition received from an industrial user or POTW, and in accordance with 40 CFR 403.8(f)(6), determine that such industrial user is not a significant industrial user.

*The term "Control Authority" refers to the Washington State Department of Ecology in the case of non-delegated POTWs or to the POTW in the case of delegated POTWs.

Slug Discharge—Any discharge of a non-routine, episodic nature, including but not limited to an accidental spill or a non-customary batch discharge to the POTW. This may include any pollutant released at a flow rate which may cause interference with the POTW.

State Waters—Lakes, rivers, ponds, streams, inland waters, underground waters, salt waters, and all other surface waters and watercourses within the jurisdiction of the state of Washington.

Stormwater—That portion of precipitation that does not naturally percolate into the ground or evaporate, but flows via overland flow, interflow, pipes, and other features of a storm water drainage system into a defined surface water body, or a constructed infiltration facility.

Technology-based Effluent Limit—A permit limit that is based on the ability of a treatment method to reduce the pollutant.

Total Coliform Bacteria—A microbiological test which detects and enumerates the total coliform group of bacteria in water samples.

Total Dissolved Solids—That portion of total solids in water or wastewater that passes through a specific filter.

Total Suspended Solids (TSS)--Total suspended solids is the particulate material in an effluent. Large quantities of TSS discharged to a receiving water may result in solids accumulation. Apart from any toxic effects attributable to substances leached out by water, suspended solids may kill fish, shellfish, and other aquatic organisms by causing abrasive injuries and by clogging the gills and respiratory passages of various aquatic fauna. Indirectly, suspended solids can screen out light and can promote and maintain the development of noxious conditions through oxygen depletion.

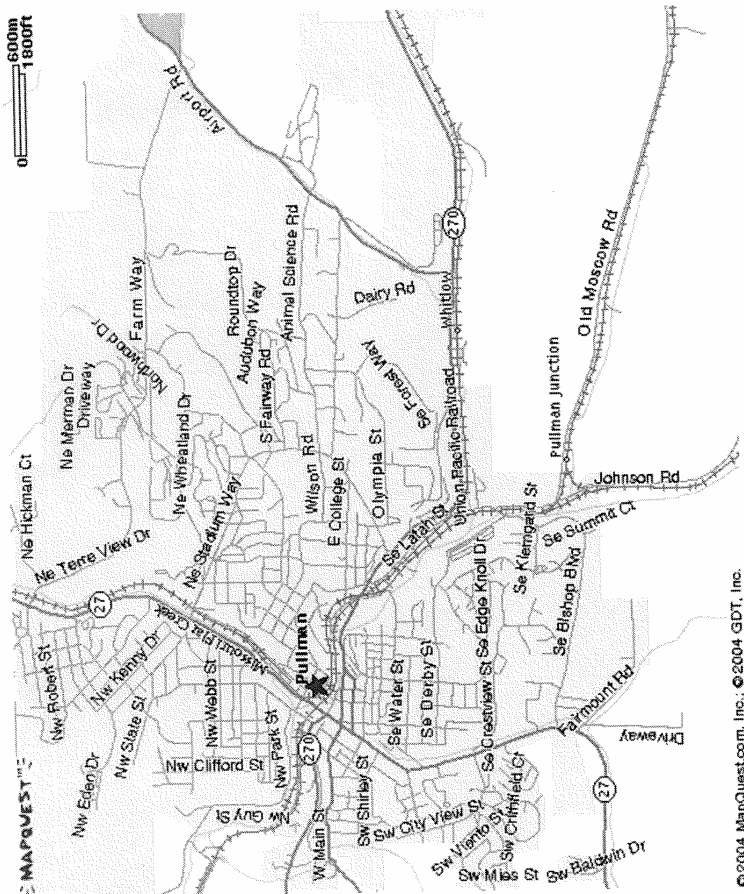
Water Quality-based Effluent Limit—A limit on the concentration of an effluent parameter that is intended to prevent the concentration of that parameter from exceeding its water quality criterion after it is discharged into a receiving water.

APPENDIX C—TECHNICAL CALCULATIONS

APPENDIX D—RESPONSE TO COMMENTS

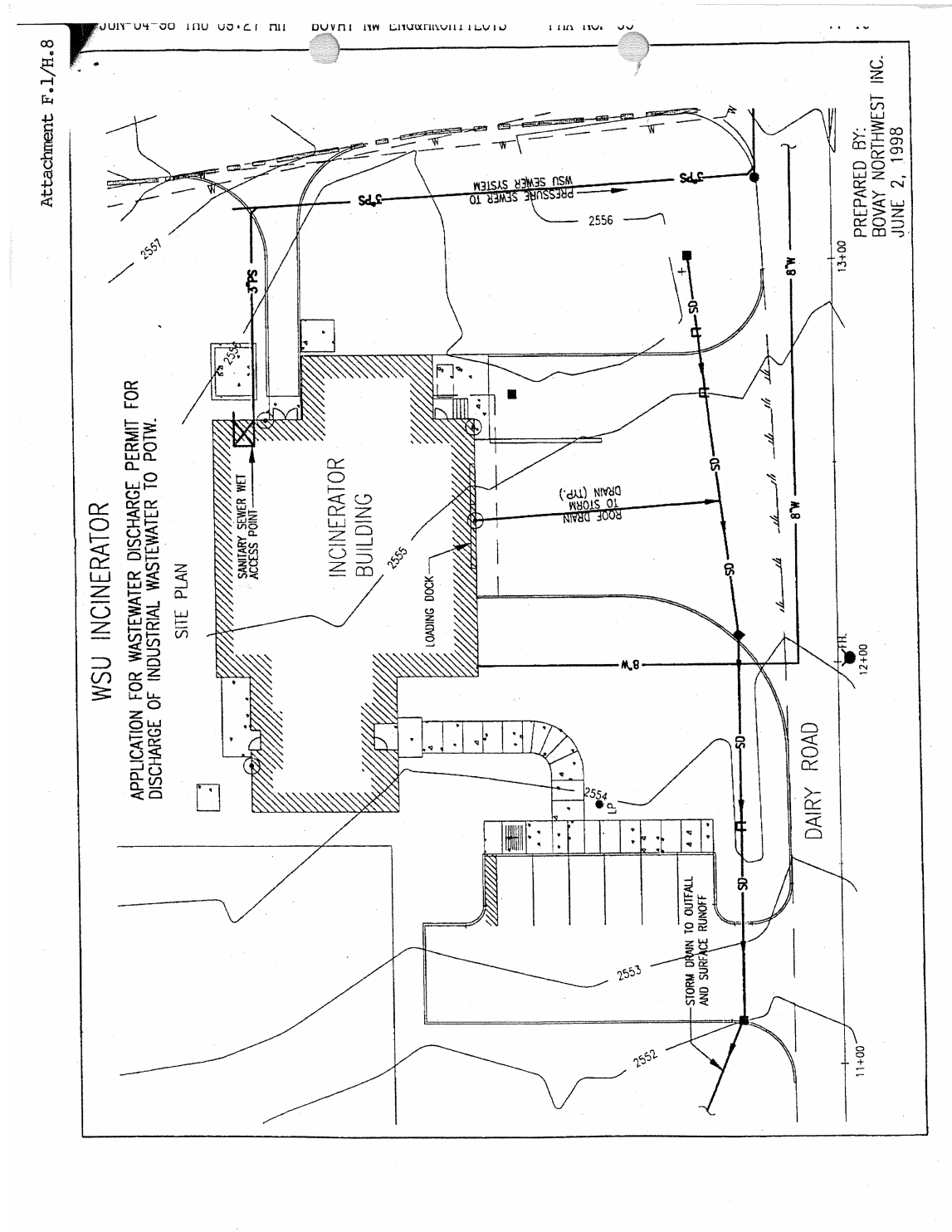
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APPENDIX E – INFORMATION: MAP#1 – LOCATION OF INCINERATOR (LOCATED AT THE END OF DAIRY ROAD)



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APPENDIX E – INFORMATION: MAP#2-DETAIL SITE MAP OF INCINERATOR



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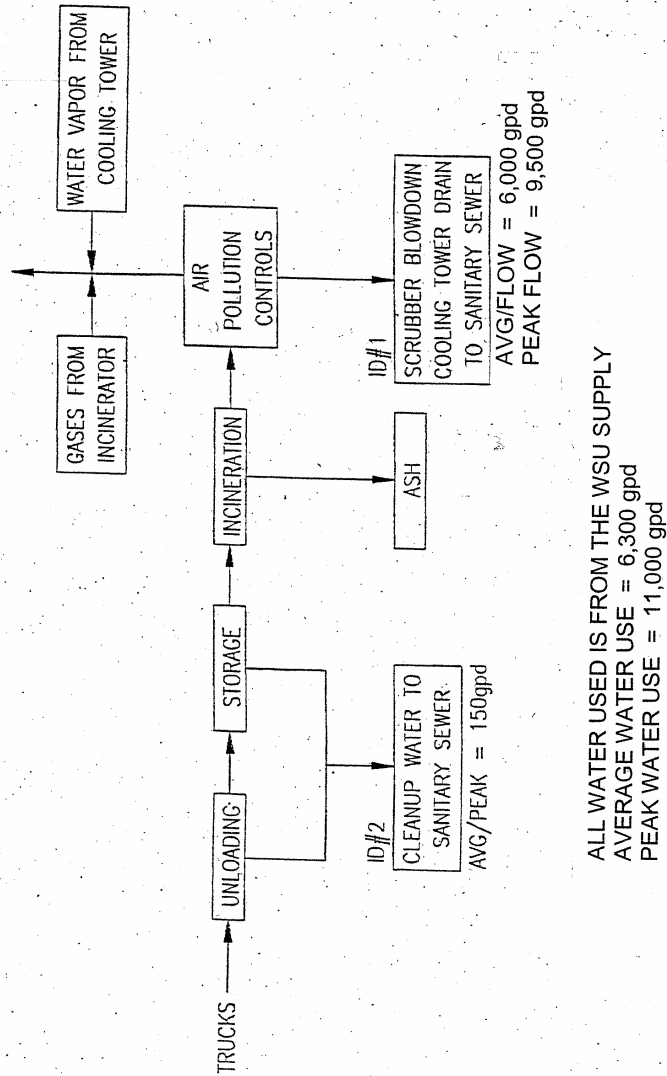
appendix e- information: diagram #1-Process diagram

Attachment C.2

WSU INCINERATOR

APPLICATION FOR WASTEWATER DISCHARGE PERMIT FOR
DISCHARGE OF INDUSTRIAL WASTEWATER TO POTW.

SCHEMATIC DIAGRAM
FIGURE C-2



FACT SHEET FOR STATE WASTE DISCHARGE PERMIT ST-8061
FACILITY NAME WASHINGTON STATE UNIVERSITY MEDICAL WASTE INCINERATOR

APPENDIX E-INFORMATION: DIAGRAM #2-WASTEWATER DISCHARGE FLOW

